

**REMARKS/ARGUMENTS**

Favorable reconsideration and allowance of the present application are respectfully requested in view of the following remarks.

In the Final Office Action, the Examiner made the following rejections:

- Rejected claims 1-4 under 35 U.S.C. § 103(a) as allegedly being unpatentable over JP 2000-022188 A (“JP’ 188”) in view of Kannegiesser et al (U.S. Patent No. 6,309,506), and further in view of Garbini et al (U.S. Patent No. 3,883,386);
- Rejected claims 5-8 allegedly being unpatentable over JP’ 188 in view of Garbini et al, and further in view of Focke et al (U.S. Patent No. 5,674,542);
- Rejected claim 11 as allegedly being unpatentable over JP’ 188, Kannegiesser et al and Garbini et al as applied to claim 3, and further in view of Meyer (U.S. Patent No. 4,997,507);
- Rejected claim 12 as allegedly being unpatentable over JP’ 188, Garbini et al, and Focke et al as applied to claim 7, and further in view of Meyer; and
- Rejected claims 13-24 as allegedly being unpatentable over various combinations of Meyer, Matsuda et al, Kannegiesser et al Rasero.

In the Amendment After-Final submitted on February 20, 2009, Applicants canceled claims 13-24 without prejudice or disclaimer and traversed the rejections of claims 1-12. Applicants maintain the arguments.

In the Final Office Action, the Examiner alleged that the conveyance mechanism and the conveyor 10 described in JP '188 are separate and are equivalent to the positioning belt and the heating belt as claimed. In the Amendment After-Final, Applicants demonstrated that the conveyance mechanism and the conveyor 10 disclosed in JP '188 are one and the same. In the Advisory Action, the Examiner referred to paragraphs [0019] and [0029] of the machine translation of JP '188 as allegedly disclosing both the conveyance mechanism and the conveyor 10 but the conveyance mechanism is "not shown."

Applicants submit herewith a verified partial translation of JP '188 including the paragraphs specifically relied upon by the Examiner. Paragraph [0015] states "This soldering apparatus 1 includes a conveyor 10 which acts as conveyance mechanism to convey a photovoltaic cell (c) and a tab lead (t) rightward in Fig. 1." It is clear that the conveyor 10 and the conveyance mechanism are one and the same.

The conveyor 10, i.e., the conveyance mechanism, includes a supplying stage 11, a connecting stage 12, and a carrying out stage 13, all of which are illustrated in Fig. 1 of JP '188. Both paragraphs [0019] and [0029] simply indicate that a photovoltaic cell (c) with the tab leads (t) positioned thereon is loaded onto the conveyor 10 at the supplying stage 11. It is clear in both paragraphs that what is "not shown" refers to the manner in which the cell (c) with the tab leads (t) are loaded onto the supplying stage 11 from the tab lead

feed mechanism 15. From paragraph [0019], JP '188 suggests that suction pads can be used, but this is not illustrated in Fig. 1.

As made clear, JP '188 does not disclose the positioning belt and the heating belt as recited.

All objections and rejections raised having been addressed, it is respectfully submitted that the present application is in condition for allowance. Should there be any outstanding matters that need to be resolved, the Examiner is respectfully requested to contact Hyung Sohn (Reg. No. 44,346), to conduct an interview in an effort to expedite prosecution in connection with the present application.

Pursuant to 37 C.F.R. §§ 1.17 and 1.136(a), Applicants respectfully petition for a two (2) month extension of time for filing a reply in connection with the present application, and the required fee is attached hereto.

REQUEST FOR RECONSIDERATION  
U.S. Application No. 10/584,712

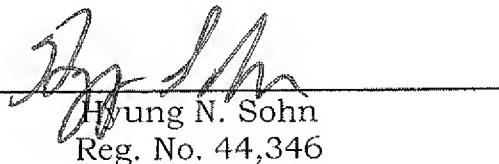
Atty. Docket No.: 900-555  
Art Unit No.: 1793

The Commissioner is authorized to charge the undersigned's deposit account #14-1140 in whatever amount is necessary for entry of these papers and the continued pendency of the captioned application.

Respectfully submitted,

**NIXON & VANDERHYE P.C.**

By: \_\_\_\_\_



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**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

In re Patent Application of: KAWAGOE et al

Application No. 10/584,712

Filed: June 26, 2006

For: SOLAR BATTERY MODULE PRODUCTION METHOD AND SOLAR BATTERY MODULE PRODUCTION APPARATUS

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Commissioner for Patents  
P. O. Box 1450  
Alexandria, VA 22313-1450

Dear Sir:

**VERIFICATION OF ENGLISH TRANSLATION**

I, Yutaka NAGAI, of 3-1179-5, Nimyou, Nara-shi, Nara 631-0072 Japan, declare that I am conversant in both the Japanese and English languages and that the English translation as attached hereto is an accurate English translation of paragraphs [0014], [0015], [0019] and [0029] of Japanese Unexamined Patent Publication No. 2000-022188.

All statements made herein of my knowledge are true and all statements made on information and belief are believed to be true, and further that these statements were made with the knowledge that willful false statements and the like so made are punished by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issuing thereon.

Signed this 15<sup>th</sup> day of April, 2009



Name of Person Signing

Partial Translation of JP2000-22188A

[0014]

[An embodiment of the Invention] Hereinafter, a preferred embodiment of the present invention will be described referring to the drawings. Fig. 1 is a schematic perspective view illustrating the whole of a soldering apparatus 1 of the embodiment of the present invention.

[0015] This soldering apparatus 1 includes a conveyor 10 which acts as conveyance mechanism to convey a photovoltaic cell (c) and a tab lead (t) rightward in Fig. 1. The conveyor 10 has a supplying stage 11 at an introducing position thereof (at the left end of the conveyor 10 in Fig. 1). The photovoltaic cell (c) with the tab lead (t) positioned thereon is supplied to the supplying stage 11. Further, the conveyor 10 has a connecting stage 12 downstream from the supplying stage 11 in the conveying direction of the conveyor 10 (at the right side of the supplying stage 11 in Fig. 1). On the connecting stage 12, the tab lead (t) is electrically connected to the photovoltaic cell (c). Further, in this embodiment, the conveyor 10 has a carrying out stage 13 downstream from the connecting stage 12 in the conveying direction of the conveyor 10 (at the right side of the connecting stage 12 in Fig. 1). The conveyor 10 carries out a string (s) soldered and manufactured by the soldering apparatus 1 through the carrying out stage 13.

[0019] Such a photovoltaic cell (c) with the tab leads (t) positioned

thereon is loaded onto the conveyor 10 at the supplying stage 11 by means of a conveyance mechanism (not shown) equipped with a suction pad and the like.

[0029] In the above-mentioned soldering apparatus 1 of this embodiment of the present invention, the two tab leads (t) supplied from the tab lead feed mechanism 15 are positioned on one photovoltaic cell (c) at a time, at the predetermined positions, supplied from the photovoltaic cell feed mechanism 16. Then, the photovoltaic cell (c) with the tab leads (t) positioned thereon is loaded onto the conveyor 10 at the supplying stage 11 by means of the conveyance mechanism (not shown).